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APPLICATION NO.		FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/620,540		07/16/2003	Eric Norland	354-7U1	8438
570	7590	06/03/2005		EXAMINER	
		AUSS HAUER & F	PENG, CHA	PENG, CHARLIE YU	
ONE COMP 2005 MARI		SQUARE REET, SUITE 2200	ART UNIT	PAPER NUMBER	
PHILADELPHIA, PA 19103				2883	
				DATE MAILED: 06/03/2005	5

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)					
<b></b>	10/620,540	NORLAND, ERIC					
Office Action Summary	Examiner	Art Unit					
	Charlie Peng	2883					
The MAILING DATE of this communication a Period for Reply	ppears on the cover sheet w	ith the correspondence address					
A SHORTENED STATUTORY PERIOD FOR REP THE MAILING DATE OF THIS COMMUNICATION  - Extensions of time may be available under the provisions of 37 CFR after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a re  - If NO period for reply is specified above, the maximum statutory perior  - Failure to reply within the set or extended period for reply will, by statt Any reply received by the Office later than three months after the mail  - earned patent term adjustment. See 37 CFR 1.704(b).	I. 1.136(a). In no event, however, may a eply within the statutory minimum of thi d will apply and will expire SIX (6) MOi ute, cause the application to become A	reply be timely filed  ty (30) days will be considered timely.  NTHS from the mailing date of this communication.  BANDONED (35 U.S.C. § 133).					
Status							
1) Responsive to communication(s) filed on 23	March 2005.						
<u> </u>							
3) Since this application is in condition for allow	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims							
4) ☐ Claim(s) 1-14 is/are pending in the application 4a) Of the above claim(s) is/are withdrest is/are allowed.  5) ☐ Claim(s) is/are allowed.  6) ☐ Claim(s) 1-12 is/are rejected.  7) ☐ Claim(s) 13 and 14 is/are objected to.  8) ☐ Claim(s) are subject to restriction and the subject to restric	rawn from consideration.						
Application Papers							
9) The specification is objected to by the Examination The drawing(s) filed on 14 February 2005 is/a Applicant may not request that any objection to the Replacement drawing sheet(s) including the correction.	are: a)⊠ accepted or b)□ e drawing(s) be held in abeya	nce. See 37 CFR 1.85(a).					
11) The oath or declaration is objected to by the l	· · ·	•					
Priority under 35 U.S.C. § 119							
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:  1. Certified copies of the priority documents.  2. Certified copies of the priority documents.  3. Copies of the certified copies of the priority documents.  * See the attached detailed Office action for a list	nts have been received. nts have been received in A iority documents have beer au (PCT Rule 17.2(a)).	Application No received in this National Stage					
Attachment(s)  Notice of References Cited (PTO-892)	4) 🗖 Intensiow	Summary (PTO-413)					
Notice of Neterences Cited (F10-092) Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/0 Paper No(s)/Mail Date	Paper No	s)/Mail Date Informal Patent Application (PTO-152)					

#### **DETAILED ACTION**

## Response to Arguments

Applicant's arguments, see pages 5-7 of a supplemental reply, filed 23 March 2005, with respect to the rejections of claims 1, 5, 6, and 8 under 35 U.S.C.§103(a) have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, applicant's amendment necessitated the new ground(s) of rejection presented in this Office action.

Applicant's arguments, see pages 7-9, filed 14 February 2005, with respect to the rejection of claim 10 under 35 U.S.C.§102 have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of newly found prior art reference.

Applicant's arguments filed 14 February 2005 on claim 12 have been fully considered but they are not persuasive. Though it is true that applicant teaches a device capable of providing three-dimensional information, such language is not in the claim, which only stated the limitation "measurements of dimensional characteristics of the optical fiber connector". With its lens magnification known, microscope is capable of two-dimensional measurements. Claim 12 stands rejected.

#### Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C.§103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

1. Claim 1, 5, 6, and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,412,987 to Horwitz et al. Horwitz et al. teach a base plate (108) having an opening (not numbered, see Fig. 5 or Fig. 7) mounted to a slotted receptor plate (44) of a microscope. Horwitz et al. teach an aperture plate having an aperture (112, Fig. 6) that locates in the center of the opening of the base plate. Horwitz et al. do not teach a pair of guide pins included on the aperture plate. Horwitz et al. teach a pair of cylindrical fasteners (114), parallel to each other and perpendicular to a upper surface of the aperture plate, used to hold an optical fiber connector (101) securely on the aperture plate in threaded holes (126, 128). The fasteners are not permanent parts of the aperture plate, but it would have been obvious to one having ordinary skill in the art at the time the invention was made to integrate them on the aperture plate since it has been held that "the use of a one piece construction instead of the structure disclosed in the prior art would be merely a matter of obvious engineering choice." In re-Larson, 340 F.2d 965, 968, 144 USPQ 347, 349 (CCPA 1965) The motivation can be to reduce the number of working part or to reduce the overall cost of manufacturing the fixture.

As for the limitation that the base plate has "an opening sized to complementarily received the optical fiber connector", Howitz teaches, in another embodiment illustrated in Fig. 4, a base plate 82 having a center hole 84 with a

fitting 90. It is sized that the forward end 102 of an optical fiber terminus 100 can be snugly (i.e. complementarily) inserted therein. It would have been obvious to one having ordinary skill in the art at the time the invention was made to size the hole/opening 84 snugly for a fiber connector. The motivation would be that such sizing provides an additional fastening/securing capability for the connector.

- 2. Claims 3, 4, and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,412,987 to Horwitz et al. Horwitz et al. disclose the claimed invention except for the material of choice in making the base plate, the aperture plate, and the pins. It has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. (In re Leshin, 125 USPQ 416) It would have been obvious to one having ordinary skill in the art at the time the invention was made to use a material having properties best fitted for this application. The motivation of using a material such as carbide or stainless steel can be to extend overall lifetime of the fixture because such materials are more wear-resistant than plastic or wood.
- 3. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,412,987 to Horwitz et al. Horwitz et al. teach the claimed invention except for a predetermined angular offset of the guide pins. However, those with ordinary skill in the art know that 8 degrees is the accepted angular connector endface offset angle used in high performance optical fiber connectors to minimize the effects of back-reflection. Since the connectors themselves cannot be easily altered during examination, it would have been obvious to offset the

effects of the angle by tilting the guide pins so that a microscope can still focus on the ends of saod optical fiber connector.

- 4. <u>Claim 9</u> is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,412,987 to Horwitz et al in view of U.S.P.G.Pub 2004/0045509 to Or et al. Horwitz discloses the claimed invention except for the relief cut into a middle portion of the guide pins. Or et al. teach a relief region (236) formed on a shaft of a lift pin that moves through a guide hole (118). It would have been obvious to a person with ordinary skill in the art at the time the invention was made to create a relief portion on the guide pin. This combination reduces overall contacting areas and friction forces between the pin and the hole and makes insertion and removal of the pins an easier process.
- 5. Claim 10 is rejected under 35 U.S.C. 103(a) as being unpatentable over Horwitz et al. Horwitz et al. teach a base plate (108) having an opening (not numbered, see Fig. 5 or Fig. 7) mounted to a slotted receptor plate (44) of a microscope. Horwitz et al. teach an aperture plate having an aperture (112, Fig. 6) that locates in the center of the opening of the base plate. Horwitz et al. teach a pair of threaded holes (126, 128) that receive fasteners used to hold an optical fiber connector (101) securely on the aperture plate. The applicant argues that fasteners taught by Horwitz are screws instead of guide pins. Fixing optical connectors are known to include many different means, e.g., screws, pins, nuts and bolts. (See U.S. Patent 6,752,536 to Boyer et al.) It would have been obvious for one having ordinary skill in the art to switch among different fastening means and base receiving means of the optical connectors upon the fastening

means. The motivation would be that each fastening mean has its own advantages. While screws are more secure fasteners, pins allow the connectors to be placed and displaced more quickly during examination.

6. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,412,987 to Horwitz et al. as applied to claim 1. Claim 12 teaches the first two parts of method by which the apparatus disclosed in claim 1 is operated. The method is inherent to the apparatus and also considered unpatentable. Though it is true that applicant teaches a device capable of providing three-dimensional information, such language is not in the claim, which only stated the limitation "measurements of dimensional characteristics of the optical fiber connector". With its lens magnification known, microscope is capable of two-dimensional measurements. In addition, it would have been obvious for a person with ordinary skills in the art at the time the invention was made to operate the microscope to obtain dimensional characteristics of the optical fiber connector, since, in the applicant's own words, such an operation is "conventional in the art of multi-fiber optical connectors, and are obtained in manner well-known in the art".

## Allowable Subject Matter

7. Claims 13 and 14 are objected to as being dependent upon a rejected base claim 12, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The following is a statement of reasons for the indication of allowable subject matter: a search

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in the prior art does not disclose a method of calculating an offset angle and a

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calibration factor of the fixture based on the offset angle similar to what the

applicant has disclosed. It is this examiner's opinion that prior art taken alone or

in combination does not render obvious what the applicant has claimed.

Conclusion

8. The prior art made of record and not relied upon is considered pertinent

to applicant's disclosure. U.S. Patent 5,731,893 to Dominique; U.S. Patent

6,215,555 to Chivers.

9. Any inquiry concerning this communication or earlier communications

from the examiner should be directed to Charlie Peng whose telephone number

is (571) 272-2177. The examiner can normally be reached on 8:30 am - 5 pm M-

F.

If attempts to reach the examiner by telephone are unsuccessful, the

examiner's supervisor, Frank Font can be reached on (571) 272-2415. The fax

phone number for the organization where this application or proceeding is

assigned is 703-872-9306.

Frank G. Font Supervisory Patent Examiner

Technology Center 2800

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10. Information regarding the status of an application may be obtained

Charlie Peng Charlie.Peng@uspto.gov

(toll-free).